

Appendix F: Catalog of ArcView GIS Resources

Overview of GIS Use for This Project

One of the strengths of a Greenways and Blueways System is that it provides benefits across a wide range of community components, natural and man-made. A frequent benefit is the linkage of facilities or activities, and as a result, leveraging resources or providing new connections within a community. Geographic Information Systems (GIS) can spatially represent community assets, features, resources, and liabilities. The layering of this information into one map shows the spatial relationship between these community features. Knowing where these entities exist allows a more informed, detailed planning process that can target, avoid, connect, or highlight community features.

At the outset of the Region 2000 Greenways and Blueways planning process, it was determined that the ArcView GIS platform would be used to plan the regional development of the trail system. First, local counties and agencies were asked to supply GIS files (shapefiles) that could aid in the identification of preferred greenway routes. The counties varied in the amount and quality of data available and provided. Next, an exhaustive GIS data search was conducted at such Internet data clearinghouse sites as the USGS, GIS Data Depot, University of Virginia Library, Radford University, U.S. Fish and Wildlife Service, TIGER 2000, and others.

The GIS data were chosen based on necessity, availability and quality (being current and accurate). All data gathered were organized and developed further when necessary. Data development included adjusting the map projection of each file for overlay purposes, clipping to the study area, joining or adding attribute data, and creating new shapefiles by either selecting features of an existing shapefile or digitizing.

The data were then assembled to produce large, informative, base maps for public meetings, input, and planning. These base maps were created for each county in the Region 2000 area and included roads, streams, town boundaries, existing trails, facilities, and other community assets. Public input included the additions of key features to be connected, and these were digitized in the GIS for future public meetings.

Overview

Catalog of Available GIS Files

The proposed trail alignments were digitized in the GIS environment, based on stream, road, and key facility locations, and added to the base maps for further public meetings and comments. It is anticipated that each of the local governments will incorporate the Region 2000 greenway system into their various planning efforts and coordinate trail development with neighboring jurisdictions. The result will be a connected system of Greenways and Blueways that serve the Region 2000 area.

GIS Files Received

Amherst County

- No files received from Amherst County

Appomattox County

- No files received from Appomattox County

Bedford County

- Roads
- Hydrology
- County boundary
- Wetlands
- Floodplain
- Bridges
- Fire stations
- Parks
- Railroads
- Town boundary
- Sewer system (manholes, lines)

Campbell County

- Hydrology
- Roads
- County boundary

Lynchburg City

- Intergraph shop; files incompatible with ArcView

DCR (Department of Conservation and Recreation)

- Conservation lands
- Trails (existing and proposed)
- Blueways (existing and proposed)
- Scenic rivers
- Highways (VDOT)
- Virginia byways (scenic highways)
- Important sites
- Natural heritage sites

Virginia Economic Development Partnership

- Airports
- Fire Stations
- Industrial Sites
- Hospitals
- Public Golf
- Schools

USGS

- Land Cover 30m resolution

Tiger 2000

- County boundaries
- Roads
- Landmarks
- Railroads
- Streams
- Towns
- Water bodies

GIS Files Digitized by Greenways Incorporated

- Primary trails
- Trails
- Bike routes
- Blueways
- City of Lynchburg – GWI digitized greenways, trails (existing and proposed)
- Regional bike plan – GWI digitized map from Regional Commission